



# WA-AK HFMA Conference

## Healthcare Property Underwriting 101

February 25, 2014

Annette Konieczka

Michael Widdekind

Healthcare Practice Group - Property

# Insurance Terminology



- **Underwriting** - The process of determining whether to accept a risk and, if so, what amount of insurance the company will write on the acceptable risk, and at what rate.<sup>1</sup>
- **Underwriter** – Any individual in insurance who has the responsibility of making decisions regarding the acceptability of a particular submission and of determining the amount, price and conditions under which the submission is acceptable.<sup>1</sup>
- **All Risks coverage** – Property insurance covering loss arising from any fortuitous cause except those that are specifically excluded.<sup>1</sup>

<sup>1</sup> 2000-2014 International Risk Management Institute, Inc. (IRMI)

# What do we rate?



- **FLEXA**
  - Fire
  - Lightning
  - Explosion
  - Aircraft
- **AOP – All other Perils**
  - Theft
  - Wind/Hail – other than Named Storm
  - Vandalism
  - Civil Commotion
  - Smoke Damage
  - Vehicle
  - Earthquake Sprinkler Leakage
- **CAT Perils**
  - Earthquake
  - Flood
  - Named Storm Wind
  - Terrorism

# The Basics



C

o  
n  
s  
t  
r  
u  
c  
t  
i  
o  
n

O

c  
c  
u  
p  
a  
n  
c  
y

P

r  
o  
t  
e  
c  
t  
i  
o  
n

E

x  
p  
o  
s  
u  
r  
e

# Construction



- Fire Resistive
- Modified Fire Resistive
- Masonry Non-Combustible
- Light Non-Combustible
- Joisted Masonry
- Wood Frame

# Occupancy



- Hospital
- Clinic
- MOB
- Warehouse
- Dwelling
- Parking Garage
- Senior Living

# Protection



- Fully Sprinklered
- Sprinklered where necessary
- Non-sprinklered
- Special Systems where necessary
- Smoke detection
- Alarm/Watchman
- Water Supply

# Exposure – External



- Vegetation
- Building types
- Occupancy types
- Protection of the exposure
- Distance between insured property and exposure
- Multi-tenanted space



# Is there more?



- Location
- Human Element / Risk Management
- Water Damage Mitigation
- Loss History
- Valuation Issues

# Program Structure



- Policy Limit
  
- Terms and conditions
  - Location limits vs. Blanket limit
  - Extensions of coverage
    - Extended Period of Indemnity
    - Ordinary Payroll
    - Service Interruption
    - Increased Cost of Construction
    - Accounts Receivable
    - Valuable Papers
    - Etc.
  
- Deductibles
  - Combined PD/BI
  - Split PD/BI

# Natural Catastrophe Rating



- Earthquake
- Flood
- Named Storm Wind

# Earthquake modeling and rating



- Primary Characteristics
  - Address
  - Construction type
  - Occupancy
  - Number of stories
  - Year built

# Earthquake modeling and rating

- Secondary Characteristics

– Plan Irregularity	Regular/Irregular
– Soft Story	Yes/No
– Vertical Irregularity	Yes/No
– Cladding Type	Glass/Pre-Cast/Unreinforced Masonry
– Short Column	Yes/No
– URM Chimney/Partition	Yes/No
– Ornamentation	Little or None/Average/Extensive
– Crippled Walls	No Crippled Walls/Braced Crippled Walls/Unbraced Crippled Walls
– Frame Bolted	Bolted/Unbolted
– Anchoring	Purlins properly anchored/Purlins not properly anchored
– URM Retrofit	Yes/No
– Structural Upgrade	Yes/No
– Equipment EQ Bracing	Generally Well Braced/Somewhat Braced/Generally Unbraced
– Construction Quality	Good/Average/ Poor
– Equipment Support Maintenance	No Signs of Fatigue/Few Signs of Fatigue/Obvious Fatigue
– Pounding	Yes/No
– Engineered Foundation	Yes/No
– Sprinkler Type	Wet/Dry
– EQSL Susceptibility	Low/High
– Base Isolation	Yes/No

# Earthquake modeling and rating



- EQ Sublimit
- EQ Deductible
  - % vs. \$
  - PUI

# Underwriting Flood



- Is the location in a flood zone? What is the water source?
- Flood elevation vs. Finished floor elevation
- Basement, basement, basement
- What equipment is in the basement and what is the value?
- Is there a large BI exposure attached to the equipment?
- Is there entry into the basement from outside?
- Is there flood protection?
- Do you have a water mitigation plan in place?

# Underwriting Flood



- Flood Sublimit
- Flood deductibles
  - Per occurrence
  - Per location



# Terrorism



- Location
- Terrorism Limit
- Occupancy

February 25, 2014

Michael Widdekind, CFPS

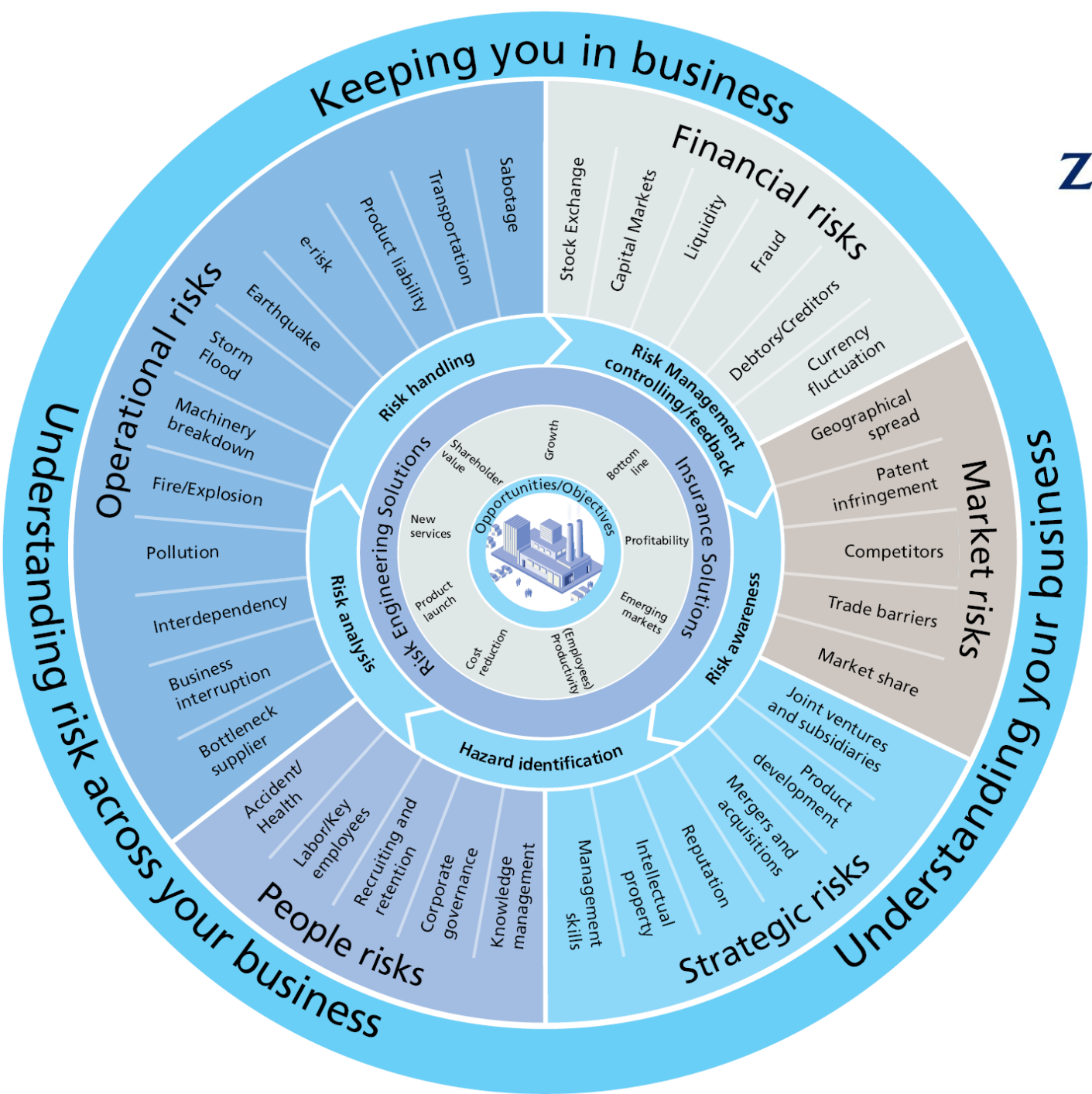
Technical Director - Property

# Property Risk Engineering for Healthcare

# Objectives



- How risk engineering fits into Enterprise Risk Management (ERM)
- Understand lessons learned from previous events
- Identify mitigation strategies
- Highlight preparedness activities
- Recognize the need for a quick response
- Review recovery actions



# Mitigation strategies



- Risk assessments
- Lessons learned
- Building site design considerations
- Building envelope considerations
- Redundant primary power
- Emergency power considerations
- Eliminate critical operations and equipment from basement areas

# Mitigation strategies

## Risk Assessments



- Risk Assessments
  - Project Life Cycle
    - Plan review (including shop submittals)
    - Builder's risk visits
    - Commissioning
  - Focused risk assessments
    - Wind
    - Flood
      - ✓ Storm surge
      - ✓ Riverine flooding
      - ✓ Surface water

# Mitigation strategies

## Risk Assessments



- Risk Assessments
  - Risk Assessment Factors
    - Construction
    - Hot work / contractor controls
    - Housekeeping & smoking controls
    - Training
    - Maintenance
    - Management programs
    - Fixed fire protection including sprinklers
    - Fire protection water supply
    - Fire detection

# Mitigation strategies

## Risk Assessments



- Risk Assessments
  - Risk Assessment Factors (cont.)
    - Electrical systems and equipment
    - Heating and cooling
    - Incidental hazards
    - Control of process hazards
    - Arson
    - Yard Storage
    - Fire team
    - Fire brigade



# Mitigation strategies

## Lessons learned



- Review what went wrong during similar disaster events
  - NIST Report: *Joplin, MO Tornado Study*, May 22, 2011, Section “Critical/High Occupancy: Hospital – Preliminary Findings”
    - Loss of power affected functionality of hospital
      - Power: (Source: Empire District Electric)
        - 1 power substation destroyed (supporting steel frame collapsed), 2 damaged. 20,000 without power.
        - Approx. 3,900 poles damaged; 100 miles of line downed; 31 circuits off
        - 10 transmission lines out of service; 135 transmission structures affected; 30 fiber lines cut
- **EOP: No Primary Power, No Phone, No Internet, and No Water (may also include No Waste Water Treatment)**

# Mitigation strategies

## Building envelope and site considerations



- FEMA 543, *Design Guide for Improving Critical Facility Safety from Flooding and High Winds*, January 2007
- American Society of Civil Engineers (ASCE), ASCE/SEI 7-10, *Minimum Design Loads for Buildings and Other Structures*
- American Society of Civil Engineers (ASCE), ASCE/SEI 24-05, *Flood Resistant Design and Construction*

# Mitigation strategies

## Redundant primary power



- Main feeder and secondary feeder should come from separate substations
- Main feeder and secondary feeder should not run on the same transmission line path

# Mitigation strategies

## Emergency power considerations

- Central Energy Plant (CEP) should have connections for:
  - Portable boiler
  - Portable chiller
  - Portable generator
  - Potable and process water



- Critical off-site locations:
  - Minimum: connection for portable generator

# Mitigation strategies

Eliminate critical operations and equipment from basement areas

- Equipment subject to salt water infiltration has to be replaced
- Basements and subbasements fill with water due to electrical vaults and openings around electrical conduit
- Hydrostatic pressure causes water to be forced up through control joints at the slab floor and wall intersection points
- Water infiltration and flood proofing consultants should be consulted to properly address below grade areas

# Preparedness strategies



- Electronic data backup and access
  - The mirror data center should not be located in the same geographical region
  - Don't locate data centers and phone switches in below grade areas
  - Don't expose data centers and phone switches to exterior windows unless they are protected
  - **Keep access to paper forms**

# Response and recovery strategies



- Vendor agreements and MOU's
- Employee / vendor credentialing and site security
- Accounting documentation
- Get help to manage the loss during continued operations
- Building envelope evaluation

# Response and recovery strategies



- Vendor agreements and MOU's
  - In addition to contracts with your local vendors, overlay national vendors to assist in a disaster event
    - Local vendors and their employees may be effected during the disaster event
    - National vendors will stage assets outside the target area prior to the event



# Response and recovery strategies



- Employee / vendor credentialing and site security
  - Are you employees credentialed?
  - Are your vendors credentialed?

# Response and recovery strategies



- Accounting documentation
  - Setup separate accounting codes to track loss expenses
  - Maintain 12-24 months of business income reports (financials)
  - Up to date asset run per department
  - Medical equipment vendor contact list

# Response and recovery strategies



- Get help to manage the loss during continued operations
  - Consider the following drop-in team to assist your facility during a loss
    - Accountant
    - Facility engineer
    - Risk manager
    - Safety officer
  - Your facility staff already have a full time job running the day to day operations
  - The drop-in team can assist with managing the loss

# Response and recovery strategies

## Building envelope evaluation



- Repairs to the roof systems should be done by a qualified contractor and inspected by third party to insure a proper repair has been completed
  - Roof repairs not done adequately resulted in several failures during Sandy
  - Several roof repairs done after Sandy were found not to be done adequately

# Summary



- Understand lessons learned from previous events
- Identify mitigation strategies
- Highlight preparedness activities
- Recognize the need for a quick response
- Review recovery actions

# Questions

